

## **TECHNIQUES FOR GROUPING CIRCUIT ELEMENTS INTO LOGIC BLOCKS**

### **ABSTRACT OF THE DISCLOSURE**

[0077] Techniques are provided for grouping circuits in a user design for a programmable integrated circuit into logic blocks. A packing tool separates each circuit element into individual abstract blocks and groups the abstract block into logic blocks. A determination is made whether placement information indicates that a design goal would be improved by rearranging at least a portion of the user design. The user design can be rearranged by moving one or more of the abstract blocks into different logic blocks than the ones they were previously grouped with. Circuit elements in the same logic block can be separated and placed into different logic blocks to improve routability of the user design and signal timing.

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